

Abstracts

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we calculated Pearson correlations between changes in KCCQ and Peak VO₂ at 3 and 12 months. Confidence intervals of *r*'s were estimated via bootstrapping. **RESULTS:** The SIMPLE method produced a wider distribution of change scores than the other two methods. However, compared to BLUP-1 and BLUP-2, the SIMPLE method estimated lower correlations between changes in KCCQ and Peak VO₂ at both 3 and 12 months: At 3 months, SIMPLE *r* (95% CI) = .16 (.11, .21), BLUP-1 *r* = .28 (.18, .38), and BLUP-2 *r* = .29 (.22, .40). At 12 months, SIMPLE *r* = .22 (.15, .27), BLUP-1 *r* = .27 (.21, .33), and BLUP-2 *r* = .31 (.25, .40). **CONCLUSIONS:** Compared to the SIMPLE approach, the BLUP approach has the following advantages: 1) uses all of the longitudinal data available; 2) estimates with reasonable assumptions about missing data; 3) accommodates nonlinear and differing longitudinal trajectories for the PRO and clinical measures; and 4) minimizes the influence of noisy data.

PCV112

RESPONSIVENESS OF AF6, A NEW, SHORT, VALIDATED, AF-SPECIFIC QUESTIONNAIRE—SYMPTOMATIC BENEFIT OF DC CARDIOVERSION

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OBJECTIVES: The aim was to measure the effects on symptoms of a direct current cardioversion (DC) in patients with atrial fibrillation (AF) with a new, short, validated AF-specific questionnaire, the AF6. **METHODS:** One hundred and eleven patients (89 men, 22 women) were included in the study. Their symptoms were screened before and 12 ± 3 days after DC, using AF6, consisting of 6 items, representing the most common symptoms or experiences of patients in an AF clinic. Symptom scores were analyzed in the whole study population as well as in clinical responders and non-responders, using sinus rhythm (SR) at follow-up as a clinical anchor. **RESULTS:** The total mean score in the study population decreased, (18 ± 12.4 to 13 ± 11.6, *p* < 0.0001), and in responders (*n* = 56), (22 ± 14 vs. 12 ± 12, *p* < 0.01), but not in non-responders (*n* = 55), 14 ± 9 vs. 14 ± 11, N.S. The highest scoring items were 'breathing difficulties upon exertion' and 'tiredness due to atrial fibrillation', and they were also the most frequently scoring items (80% and 83%, respectively). The other items of the scale were present in 65%, 64%, 48% and 36% of the patients. 'Worry/anxiety due to atrial fibrillation' was present in 48% of the patients, scoring high when present. 'Breathing difficulties at rest' was the least and the lowest scoring item. Effect sizes ranged from 0 to 0.52, in responders from 0.10 to 0.85, and in non-responders from -0.23 to 0.34, the highest scores consistently relating to 'tiredness due to atrial fibrillation'. **CONCLUSIONS:** AF6 demonstrated adequate responsiveness to change, and effect sizes were mostly moderate, in responders moderate to high. The symptom scores measured by AF6 decreased significantly after DC cardioversion, especially in responders in terms of SR, confirming, that SR is an important clinical anchor.

PCV113

IMPACT OF STROKE ETIOLOGY ON CARE NEED AND LONG-TERM OUTCOMES

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OBJECTIVES: Stroke is the second leading cause of death worldwide and a major cause of long-term disability. Increasingly, stroke outcomes research is following clinical practice and not only considers all strokes together but divides them into various risk-profile subtypes. Following this approach, we performed a population-based study of all residents of Erlangen, Bavaria, Germany, to determine the risk profile distributions in a well-defined population and their long-term impact on disability and patterns of care. **METHODS:** Since 2000 the Erlangen Stroke Project (ESPro) is the reporting centre for stroke for the German Federal Government. As the only population-based stroke registry in Germany ESPro is recording each patient living in Erlangen, Bavaria, Germany (source population 100,500) who suffered from stroke. The patients were analysed at time points after admission as well as 3 and 12 month after the event. A total of 1355 patients with a first-stroke were registered in the ESPro. The cause of ischemic stroke was classified according to the TOAST criteria. Etiological TOAST classification was performed in 89% (1206) of ischemic strokes. **RESULTS:** The etiological classification of brain infarctions resulted in 12% large-artery atherosclerosis, 26% cardioembolism, 24% small-artery occlusion, 37% strokes of undetermined etiology and 2% strokes of other determined etiology. While 20% of the patients were independent functionally at the Barthel index at admission, the number was 39% after 12 month. The category large-artery atherosclerosis showed the strongest relationship with the occurring need of care. The OR with very strong care needs 12.79 (95% CI 3.71 –44.07) lay particularly high in comparison with an OR of 6.95 (95% CI 2.16–22.33) in the category cardioembolism. **CONCLUSIONS:** The TOAST classification provides an appropriate tool for estimating the need of care. In particular the patients in the TOAST category large-artery atherosclerosis showed a high level of a need of care at the long-term follow-up.

PCV114

HEALTH-RELATED QUALITY OF LIFE AMONG WOMEN WITH CORONARY ARTERY DISEASE TREATED WITH PSYCHOTROPIC MEDICATIONS

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OBJECTIVES: Recent studies have found that the use of psychotropic medications in women with coronary artery disease (CAD) led to long-term adverse outcomes such

as cardiovascular adverse events. This study examined the effect of psychotropic medication use on the health-related quality of life (HRQoL) of women with CAD. **METHODS:** Analysis was conducted using the 2007 Medical and Expenditure Panel Survey (MEPS) database, which is nationally representative of the US civilian non-institutionalized population. Female patients ≥ 18 years with CAD were included in this analysis. CAD patients were identified using a combination of International Classification of Diseases (ICD-9) diagnosis codes. HRQoL was measured using the Physical Component Summary (PCS-12) and Mental Component Summary (MCS-12) of the Short-Form 12 Version 2 (SF-12). HRQoL and sociodemographic characteristics of female CAD patients who used at least one psychotropic medication were compared with those who did not use any psychotropic medications. Bivariate comparisons were made using *t*-tests for continuous variables and chi-square tests for categorical variables. Multivariate comparisons using analysis of covariance (ANCOVA) models were conducted to assess the association of HRQoL with psychotropic use after adjusting for age, race, education, marital status, insurance status, and the number of medical conditions in 2007. **RESULTS:** Of the 4,253,569 women with CAD in the US, 1,312,413 (30.9%) took psychotropic medications. Women taking psychotropic medications reported a significantly higher number of medical conditions compared to non-users (13.25 vs. 9.51, *p* < 0.0001). The mean unadjusted differences in PCS-12 and MCS-12 scores between psychotropic drug users versus non-users suggested worse scores among women taking psychotropic medications (PCS-12: -4.93; *p* = 0.03 and MCS-12: -9.46; *p* = 0.0006), and this trend in differences continued after adjusting for covariates (PCS-12: -2.23; *p* = 0.26 and MCS-12: -7.51; *p* = 0.0034). **CONCLUSIONS:** Consistent with findings of long-term adverse outcomes from previous studies, psychotropic medication use among women with CAD was associated with significantly worse HRQoL.

PCV115

A SYSTEMATIC REVIEW OF QUALITY OF LIFE ASSESSMENT OF PATIENTS SUFFERING FROM THORACIC AORTIC DISEASES

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OBJECTIVES: To review studies assessing the quality of life associated with thoracic aortic diseases (TADs) and their treatment with Open Aortic Repair (OAR), Thoracic Endovascular Aortic Repair (TEVAR) or medical management (MM). **METHODS:** PubMed and EMBASE were searched covering terms related to TADs and patient reported outcomes/quality of life. The search was limited to articles in English and to studies relating to humans. However, no time period was specified so as to enable a broad search. The studies obtained were analysed qualitatively. **RESULTS:** Eight studies met the review criteria. Published 1998 and 2009, four dealt with aneurysms, two with dissections and two with more than one of the TADs; all of them were based on assessment of quality of life after treatment rather than on the disease itself. Only one study covered *emergency versus elective* surgery. The number of patients was very small in all studies, ranging from 75 to 11. Mean follow-up varied from 7 to 76 months. The most commonly used instrument was the SF-36. Two studies also used the Hospital Anxiety and Depression Score (HADS) in addition to the SF-36. One study adopted the SWEDQUAL questionnaire; another study had recourse to the Illness Intrusiveness Rating Scale (IIRS) and the Karnofsky Activity Scale (KAS), which lacked information on proper validation for this target population. All in all, none of the study conducted the quality of life assessment appropriately, particularly with regard to the follow-up period, the lack of pre-operative assessment and lack of direct comparison between interventions. Lastly, there were no utility assessments to be found, which would be essential to arrive at QALY values and thus take the process of economic analysis forward. **CONCLUSIONS:** The studies available so far do not provide evidence of the quality of life associated with TADs, as well as conclusive evidence of the quality of life associated with OAR; TEVAR and/or MM.

PCV116

HEALTH-RELATED QUALITY OF LIFE OF DIABETES PATIENTS WITH AND WITHOUT MACROVASCULAR COMORBIDITIES IN THE UNITED STATES

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OBJECTIVES: Diabetes mellitus has been defined as one of the global epidemics of chronic diseases by the World Health Organization. Patients with diabetes are at an increased risk of developing macrovascular disease. The purpose of this study was to examine the marginal impact of macrovascular comorbidities on health-related quality of life (HRQoL) of patients with diabetes in a United States nationally representative sample. **METHODS:** Using the pooled Medical Expenditure Panel Survey (MEPS) 2001 and 2003 data, a nationally representative adult sample (age ≥18) was included in the study. The HRQoL outcomes included the SF-12 physical component summary (PCS) score, SF-12 mental component summary (MCS) score, EQ-5D preference-based index score, and visual analog scale (VAS). Ordinary least square regressions were used to identify the relationship between macrovascular disease conditions and PCS (and MCS) after controlling for age, sex, race, ethnicity, education, income, smoking status, health insurance, proxy response, and number of other comorbid categories. Due to the distributions of the EQ-5D preference-based index and VAS score, censored linear deviations estimator (CLAD) regressions were employed. All statistics were adjusted using the proper sampling weight from the MEPS. **RESULTS:** The average PCS, MCS, EQ-5D index, and VAS scores for patients with diabetes were 40.5, 48.5, 0.75, and 66.6, respectively for the sample. Compared to diabetes patients without macrovascular comorbidities (N = 2,809), those with macrovascular comorbidities (N